

ASOS PROGRAM MANAGEMENT COMMITTEE

RECORD APMC 02-3 (FINAL)

November 14, 2002

1. CONVENED - 9:00 AM

A meeting of the ASOS Program Management Committee (APMC) was convened by Chair Douglas Hess on November 14, 2002. The meeting was in Room 4246, Silver Spring Metro Center Building 2 (SSMC-2), National Weather Service Headquarters, Silver Spring, MD.

Members participating:

Chair	- Douglas Hess
DOC	- Rainer Dombrowsky
	- Frank Kelly
DOD	- Col. Nathan Feldman, USAF
	- Tim Kimbrell (telecon for Capt. Eric McBee)
DOT	- Frank DeMarco (for Deborah Johnson)
	- David Whatley
ASOS PI	- Richard Ahlberg, Jr.
Ex. Sec.	- Lewis Kozlosky

Advisors and/or guests included: John Bradley, Rich Bunevitch, Kevin Conaty, Joe Devost, Rob Ericson, Doug Gifford, Peggy Hoch, Anthony Leonardo, David Mannarano, Bryan Moore, Tim Ross, and Al Wissman from DOC; and Paul Armbruster, Ginny Dillon, JoAnn Ford, and Jerry Kranz, from DOT.

2. OPENING REMARKS AND PREVIOUS MINUTES

Mr. Hess recognized the members and alternates in attendance as indicated above.

The July 16, 2002, Corrected Minutes were approved without comment.

3. ASOS CCB REPORT

The ASOS Configuration Control Board (ACCB) Request for Change (RC) Status Report was provided to members in their folders. Mr. Ahlberg indicated there were two Rcs pending votes from two APMC members Johnson and McBee: NWS602S AWPAG Pre-limited Production Buy-in; and NWS605S Enhanced Precipitation Identifier Development.

Mr. Kozlosky added that the Internet Interface RC is now in ASOS Configuration Control Board review.

4. NWS PROGRAM STATUS BRIEFING

Mr. Dombrowsky said the climate community wants to increase the range of ceilometers, possibly to 50,000 ft.

Mr. Whatley said the FAA requirement is 25,000 ft.

Mr. Humphrey indicated that the Air Force would also want 25,000 ft. capability. Mr. Dombrowsky agreed to investigate new ceilometer requirements.

ACU Processor Upgrade:

Mr. Ahlberg stated that all other PI projects depend on the processor upgrade. He summarized the various software loads associated with the processor upgrade.

Mr. Hess pointed out that the faster processor is uncovering previously-undetected legacy code defects. Mr. Ahlberg added that programming and compiling standards have changed, making the software corrections difficult.

Mr. Ahlberg added that Version 2.6A-3 has been authorized for deployment at 31 sites, 12 of which have been installed. He summarized the other planned software development efforts. Some examples are path errors in the Ice Free Wind Sensors, possibly caused by birds; and ALDARS errors resulting from text overflow in certain fields.

50 sites are in Operational Acceptance Testing 20 of which are wind OAT sites. The last software version 2.7A-3, will be tested soon at 17 of these 50 OAT sites. Any problems found are being investigated as needed.

Overall code architecture is also being considered for redesign. Mr. Hess asked if the operating system is being evaluated since it may not be supportable. Mr. Ahlberg replied that it is presently adequate, but would be considered for redesign in the pending studies.

Dew Point Sensor Replacement:

The evaluation of the dewpoint sensor is going well. Mr. Dombrowsky noted that the data continuity study may be affected by the phased installation of the dewpoint sensors. The data continuity study will need about one year of data collection per site.

The first full scale production option has been awarded for 405 units; 314 for NWS, and 91 for FAA.

Ice Free Wind Sensor:

There have been some problems with the evaluation: low-temperature shut down; heater circuit breaker activation; and remote access to sensor during servicing.

The software reports only one wind sensor at a time in the observation.

Full scale production may be initiated in December.

Various solutions to the problem of birds causing path errors are being investigated, including the generation of certain ultrasonic frequencies.

Ruggedized versions (model 427) are in initial phases investigation. The 427 is not being actively pursued due to schedule and test problem failure issues.

All Weather Precipitation Accumulation Gauge (AWPAG):

24 environmental qualification tests are nearly complete. 16 sites are being designated as OAT sites. A limited data continuity evaluation is being planned.

Enhanced Precipitation Identifier:

The Commerce Business Daily announcement has been issued. Contract awards are planned for May 2003.

Ceilometer Replacement:

Contract solicitation issuance is planned for May 2003, and COTS equipment awards are anticipated in early FY04.

Overall PPI Funding:

The continuing resolution will not have an impact on PPI funding since NWS ASOS PPI is level funded.

Col. Feldman indicated that the Air Force expects to begin sharing program costs beginning this FY. The MOU for the cost sharing is presently in draft.

Mr. Ahlberg concluded his presentation with a summary of deployment schedules for each PI initiative.

Mr. Hess asked Col. Feldman to provide an update on the OS21 Program.

Col. Feldman summarized that systems are being installed in Germany at two sites. Mr. Humphrey added that an evaluation is ongoing to see if the systems meet operational requirements, and that RVR is being incorporated for the evaluation.

Col. Feldman clarified that Air Force ASOSs are under the umbrella of the OS21 Program.

Mr. Hess requested the FAA provide an update on the status of AWSS.

Mr. Kranz indicated that there is an effort to put an AWSS in Lanai. Mr. Whatley added that the installation is expected to be initiated in the January/February 2003 time frame.

Overall, less than 30 AWSS systems are expected to be acquired.

5. ASOS INTERNET CONNECTIVITY

Mr. Wissman stated that the RC to authorize the Operational Acceptance Testing of the Internet interface was distributed to the ACCB on 11/13/02. Requirements from various sources have been documented and are available upon request.

Mr. Humphrey asked how security is being assured. Mr. Wissman said transmissions are encrypted and the ASOS cannot receive data via this interface.

Mr. Wissman summarized the web page layout, interface, and access. He also provided a proposed schedule and cost breakout for this initiative.

Mr. Ahlberg asked if redundancy will be maintained. Mr. Humphrey pointed out that a redundant dial-in is needed for remote AOMC support. Mr. Wissman stated he would look in to the issue.

Mr. Ahlberg asked how the interface fits in to other program priorities. Mr. Dombrowsky indicated modernization funds may be able to be redirected to the communications functions.

Mr. Ahlberg asked of the OAT RC should be reviewed by the APMC. Mr. Kozlosky pointed out the cost of that phase was well below the cost threshold of the ACCB. Mr. Hess said the ACCB has the discretion on whether the RC should go to the APMC.

Mr. Whatley pointed out that the FAA has published its Internet policy on line.

6. ASOS OPERATIONS

Mr. Wissman reported the status of ASOS monthly operations and maintenance. System Availability, Mean Time Between Failure, Mean Time Sensor Recovery (MTSR), Maintenance Restoration statistics, Trouble Ticket data, and Percentage of Missed Observations were reported.

Mr. Wissman also provided information on PPI effects on system availability.

Restoration times were all met except Pacific Region due to low sample number and difficulty of travel to sites.

7. ASOS SOFTWARE WORKING GROUP (ASWG) ACTIVITIES

Mr. Dombrowsky presented the ASWG report.

S A new RC for Version 2.8 will incorporate Versions 2.78 and 2.79.

S An RC for Version 3.0 is being readied for submission;

S Version 3.2 content has been proposed, and the RC is pending development.

The goal is to maintain a six-month development cycle. The software load tables identifying load contents were distributed at the meeting.

8. OTHER BUSINESS

Col. Feldman suggested that the NPMC and APMC meet on the same day since the meeting lengths have been reduced in recent months. The APMC concurred with meeting in the afternoon of an NPMC day. Mr. Kozlosky said he would coordinate with the NPMC Secretariat for scheduling. (See scheduling block at end of minutes.)

Mr. Kimbrell asked if the 400Mhz processor is interchangeable with the no longer supported 300Mhz version. Mr. Ahlberg said the issue is currently being tested by NWS. He added that the contract presently has a \$5M ceiling, but should be able to be kept open for subsequent acquisitions.

Mr. Dombrowsky pointed out that there is a lack of algorithm standards across different observing system programs. Doug Gifford (NWS) was reported to be working on an OFCM document pertaining to this. Mr. Humphrey said FMH-1 requires that system upgrades must meet Federal Standard Algorithms.

The following Action was assigned:

Gifford: Provide status of the Update of FMH-1 Algorithm policy.

9. ACTION ITEMS

APMC 02-1.1: Rainer Dombrowsky and JoAnn Ford - Produce and distribute a User Notification message to accommodate the three-second versus five-second wind gust averaging resulting from the deployment of the Ice Free Wind Sensor. STATUS: NEW 2/12/02; Issue still pending 7/16/02; CLOSED 11/14/02

APMC 02-2.1: Ahlberg - Provide information on the Processor Upgrade contract so the Navy can determine a participation strategy. STATUS: NEW 7/16/02; PENDING Navy Decision 11/14/02

APMC 02-2.2: Ahlberg - Request verification of Operational Requirements for higher altitude-capable ceilometers. STATUS: NEW 7/16/02; CLOSED 11/14/02 (See new Action, APMC 02-3.1)

APMC 02-2.3: Wissman - Provide statistics of PPI sensors for comparison to legacy sensors. STATUS: NEW 7/16/02; CLOSED 11/14/02 - Data will continue to be provided.

APMC 02-3.1: Dombrowsky - Verify Operational Requirements for higher altitude-capable ceilometers with the Climate Community. NEW 11/14/02

APMC 02-3.2 Gifford - Provide status of the Update of FMH-1 Algorithm policy. NEW 11/14/02

10. NEXT MEETING

The proposed date for the next APMC is May 13, 2003. Time and location: 9:00 to 1:00, Room 4246 in Building SSMC2, National Weather Service Headquarters, Silver Spring, MD.

11. EXECUTIVE SESSION

The Chair offered members the opportunity to convene an Executive Session. The committee members unanimously declined.

12. ADJOURN - The APMC adjourned at 12:10 p.m.